

CLAIMS

1. A method of generating summary information for an electronic document for use by a mobile communication device, comprising:

- 5 analyzing a content structure or properties within an electronic document;
generating document summary information which includes an assemblage of a plurality of summary entries selected from the contents of the electronic document based on the analysis of the content structure or properties; and
providing the document summary information for a mobile communication device.

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2. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises identifying a table of contents in the electronic document.

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3. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises identifying a plurality of spreadsheet worksheets in the electronic document.

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4. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises identifying a plurality of document pages in the electronic document.

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5. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises analyzing text formatting in the electronic document.

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6. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises analyzing at least one of text font names, text font sizes, text font weights, and text font styles in the electronic document.

7. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises identifying differences in paragraph alignments or indents in the electronic document.

5 8. The method of claim 1, further comprising:
wherein the act of analyzing the content structure or properties comprises identifying differences in paragraph sizes in the electronic document.

9. The method of claim 1, wherein the summary information is provided to the
10 mobile communication device without the electronic document.

10. A computer program product, comprising:
a computer storage medium;
computer program instructions stored on the computer storage medium;
15 the computer program instructions being executable on a processor for generating summary information for an electronic document by:
analyzing a content structure or properties within an electronic document;
generating document summary information which includes an assemblage of a plurality of summary entries selected from the contents of the electronic document
20 based on the analysis of the content structure or properties; and
providing the document summary information for a mobile communication device.

11. The computer program product of claim 10, wherein the computer program
25 instructions are further executable to analyze the content structure or properties by identifying a table of contents in the electronic document.

12. The computer program product of claim 10, wherein the computer program
instructions are further executable to analyze the content structure or properties by
30 identifying a plurality of spreadsheet worksheets in the electronic document.

13. The computer program product of claim 10, wherein the computer program instructions are further executable to analyze the content structure or properties by identifying a plurality of document pages in the electronic document.

5 14. The computer program product of claim 10, wherein the computer program instructions are further executable to analyze the content structure or properties by analyzing text formatting in the electronic document.

10 15. The computer program product of claim 10, wherein the computer program instructions are further executable to analyze the content structure or properties by analyzing text formatting in the electronic document; and wherein the plurality of summary entries selected from the content of the electronic document are based on identifying differences in the text formatting in the electronic document.

15 16. The computer program product of claim 10, wherein the computer program instructions are further executable to analyze the content structure or properties by analyzing at least one of text font names, text font sizes, text font weights, and text font styles in the electronic document.

20 17. The computer program product of claim 10, wherein the computer program instructions are further executable to analyze the content structure or properties by identifying differences in paragraph alignments or indents in the electronic document.

25 18. The computer program product of claim 10, wherein the computer program instructions are further executable to analyze the content structure or properties by identifying differences in paragraph sizes in the electronic document.

19. A method of generating summary information for an electronic document, comprising:

30 identifying an electronic document for which to generate summary information having a plurality of summary entries;

in the generation of the summary information:

if the electronic document has a predetermined content structure, selecting the plurality of summary entries from the electronic document based on the predetermined content structure; and

5 otherwise, if the electronic document has content properties, selecting the plurality of summary entries from the electronic document based on differences in the content properties.

20. The method of claim 19, further comprising:

10 providing the summary information in response to a request for the electronic document by a mobile communication device.

21. The method of claim 19, further comprising:

15 if the electronic document has no predetermined content structure and no content properties, selecting the plurality of summary entries from the electronic document based on differences in paragraph size.

22. The method of claim 19, wherein the predetermined content structure comprises a table of contents.

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23. The method of claim 19, wherein the predetermined content structure comprises a plurality of spreadsheet worksheets.

24. The method of claim 19, wherein the predetermined content structure
25 comprises a plurality of document pages of a portable document format.

25. The method of claim 19, wherein the content properties comprises text formatting.

26. The method of claim 19, wherein the content properties comprises text formatting including at least one of text font names, text font sizes, text font weights, and text font styles.

5 27. The method of claim 19, wherein the content properties comprises paragraph alignments or indents.

28. A server for generating summary information for electronic documents, comprising:

10 a structured document summarization process which generates summary information by selecting a plurality of summary entries from an electronic document based on a predetermined content structure identified in the electronic document; and

a formatted document summarization process which generates summary information by selecting a plurality of summary entries from an electronic document based on differences
15 in content formatting identified in the electronic document.

29. The server of claim 28, further comprising:

an unstructured/unformatted document summarization process which generates summary information by selecting a plurality of summary entries from an electronic
20 document based on differences in paragraph sizes.

30. The server of claim 28, wherein the predetermined content structure comprises a table of contents.

25 31. The server of claim 28, wherein the predetermined content structure comprises a plurality of spreadsheet worksheets.

32. The server of claim 28, wherein the predetermined content structure comprises a plurality of document pages.

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33. The server of claim 28, wherein the content formatting comprises at least one of text font names, text font sizes, text font weights, and text font styles.

34. The server of claim 28, wherein the content formatting comprises paragraph
5 alignments or indents.

35. A system which facilitates the communication of summary information for electronic documents to mobile communication devices, comprising:

a server having a structured document summarization process which generates
10 summary information by selecting a plurality of summary entries from an electronic document based on a predetermined content structure identified in the electronic document;

a wireless communication network which communicates the summary information to a mobile communication device in response to a request for the electronic document.

15 36. The system of claim 35, further comprising:

a mobile communication device which receives the summary information in response to the request for the electronic document.

37. The system of claim 35, further comprising:

20 the server having a formatted document summarization process which generates summary information by selecting a plurality of summary entries from an electronic document based on differences in content formatting identified in the electronic document.

38. The system of claim 35, further comprising:

25 the server having an unstructured/unformatted document summarization process which generates summary information by selecting a plurality of summary entries from an electronic document based on differences in paragraph sizes in the electronic document.

39. The system of claim 35, further comprising:

30 the server having a formatted document summarization process which generates summary information by selecting a plurality of summary entries from an electronic

document based on differences in content formatting identified in the electronic document;
and

the server having an unstructured/unformatted document summarization process
which generates summary information by selecting a plurality of summary entries from an
5 electronic document based on differences in paragraph sizes in the electronic document.

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